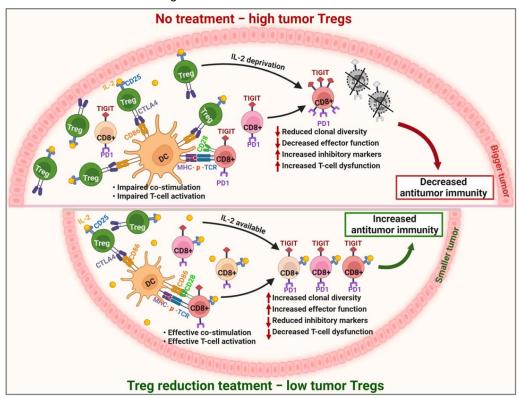
## Tumor-associated Tregs obstruct anti-tumor immunity by promoting T cell dysfunction and restricting clonal diversity in tumor-infiltrating CD8+ T cells

Arup Bag, David Noyes, Saheed Oseni, Jon Semidey-Hurtado, Ling Cen, Amod Sarnaik, Vernon K. Sondak and Dennis Adeegbe



- The emergence and sustenance of T cell dysfunction marked by upregulation of inhibitory receptors on tumor-infiltrating CD8+ T cells is mediated by high proportion of intra-tumoral Tregs through limitation of costimulatory signal availability to these effector cells.
- This dysfunctional state is further compounded by Treg-mediated deprivation of IL-2 which
  facilitates reduced survival and limits clonal diversity within the effector CD8+ T cells,
  effects that could be reversed by Treg-depleting agents and IL-2 supplementation to
  promote enhanced antitumor immunity.